

The phase diagram of the ternary Ag-Ge-In system has been experimentally examined using differential thermal analysis (DTA), scanning electron microscopy (SEM) with energy dispersive spectrometry (EDS), and X-ray powder diffraction (XRD) analysis. Investigated ternary alloys were from three vertical sections Ag-GeIn, Ge-AgIn, and In-AgGe and two isothermal sections at 200 and 400 °C. Obtained experimental results were compared with the thermodynamically extrapolated phase diagram of the Ag-Ge-In ternary system based on the thermodynamic parameters for the constitutive binary systems available in literature. Reasonable agreement between experimental data and the calculated phase diagram is obtained.